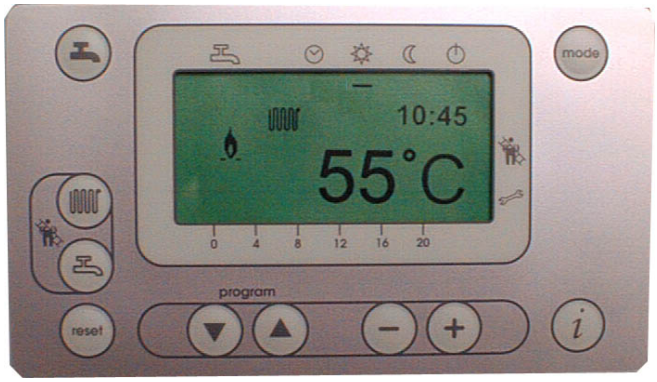
POTTERTON

Gold



Human Machine Interface
AGU 2.310

Condensing gas boilers

WH 46
WH 65

SERVICE INSTRUCTIONS

UP DATE :

5th *edition* - LMU 54 sw 3.03 – AGU 2.310 sw 1.08

INSTRUCTIONS: TO PROGRAM WH PARAMETERS

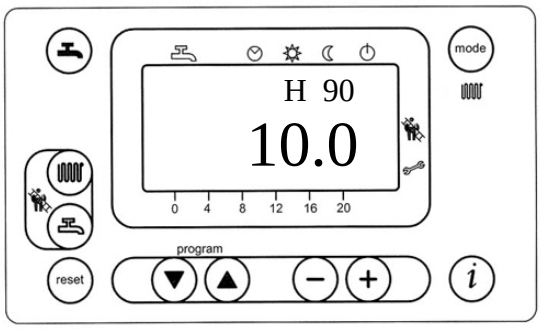
These functions complete what has already been explained in the instructions booklet provided with the boiler.

The parameters can be programmed on 2 different programming levels marked by a letter:

- USER ⟶ letter P
- INSTALLER ⟶ letter H

The installer level integrates also the parameters of the user level.
To go to level INSTALLER (letter H) please proceed as follows:

1 - Press simultaneously on buttons ▼ ▲ until the display shows **H 90** (default value = **35.0**).



1 - Press button ▲ to select the parameters in ascending order; press button ▼ to select the parameters in descending order. To change the displayed parameter press buttons ⊕ ⊖, the data is automatically selected when a new parameter is selected.

2 - Press button ⓘ to store and escape from INSTALLER level.

For the description of the parameters refer to the herewith-enclosed “DEFAULT PARAMETERS LIST WH… BOILERS”.

ADDITIONAL FUNCTIONS OF BUTTON ⓘ

Through this button, you can call to the display some additional functions as described here below:

USER FUNCTIONS

- Operating on button ⓘ it's possible to display the following information:

- DHW temperature

- Boiler sequence of running stages :

0 = Standby (no request for heat);
1 = Pre-ventilation waiting time;
2 = Fan slope;
3 = Pre-ventilation stage;
4 = Pre-starting time (the fan reaches the starting velocity);
5 = Burner starting stage;
6 = Security time within which the burner must light;
10 = Central Heating (C.H) Mode;
11 = Domestic Hot Water (D.H.W.) Mode;
20 = Post-ventilation time after a request for heat;
22 = End of the boiler operating cycle and return to standby (0);

- External temperature
- Faults/signalling code (0 = lack).
- Flow temperature.

Press mode button to return to the default display.

FUNCTIONS INSTALLER (only reading parameters)

1. Press the corresponding button ⓘ

1.1 Press simultaneously on buttons ▼ ▲ till the notice " b0 " appears on the display.

- Press ▲ button , on the display the note " **b0**" appears.

***Note**: the displayed values are instantaneously measure:*

b0 : LMU...-internal software diagnostic code.
b1 : Boiler return temperature (with NTC sensor 2).
b4 : Outside temperature (with external probe).
b7 : Flow temperature AGU2.500...

1.2 Press ▲ button , on the display the note " **C0**" appears.

- Press − + buttons to run through the list of parameters " C… " (the displayed values are measured instantaneously):

C1 : Flame sensing current (□A).
C2 : Fan speed (rpm x 100).
C3 : PWM fan signal (%).
C4 : Power (%) value used during a request for heating referring to the range Max – Min.

***Note**: the displayed values are instantaneously measure:*

1.3 Press button ▲ on the display the notice " **d0**" appears.

- Press buttons − + to look through the list of parameters "d…".

Central heating in progress

d1: Flow temperature setpoint (gas boiler equipped with AGU 2.500 for a mixing circuit control).

d2: Heating Temperature Setpoint.

d3: Reference value of the curve kt translation (with external probe connected).

- Default Value without external probe = 20.
- With QAA73 and external probe, the setpoint value of the room temperature, set out through QAA73, is displayed:

d5: value (%) maximum signal PWM during heating (parameter 541).

d6: maximum rate (rpm) of the fan during heating (parameter 536).

Hot water in progress

d1: Flow temperature setpoint (boiler equipped with tank).

d4: D.H.W setpoint.

1.4 press mode button to return to the default display

MASTER LIST HMI DEFAULT PARAMETERS				WH	
				46	65
LEVEL	PARAMETERS AGU 2.310	LEVEL DESCRIPTION	DESCRIPTION	50 kW	70 kW
P	1	End user	Time of day (hh:mm)	-----	
P	5	End user	Reduced room temperature setpoint. Note : with outdoor sensor = 16°C ; without outdoor sensor = parameter 503	16 -- 25	
P	11	End user	Time switch program HC1 switch-on time 1st period (hh:mm)	06:00	
P	12	End user	Time switch program HC1 switch-off time 1st period (hh:mm)	22:00	
P	13	End user	Time switch program HC1 switch-on time 2nd period (hh:mm)	-----	
P	14	End user	Time switch program HC1 switch-off time 2nd period (hh:mm)	-----	
P	15	End user	Time switch program HC1 switch-on time 3rd period (hh:mm)	-----	
P	16	End user	Time switch program HC1 switch-off time 3rd period (hh:mm)	-----	
P	31 *	End user	Time switch program DHW 1st period on (hh:mm)	06:00	
P	32 *	End user	Time switch program DHW 1st period off (hh:mm)	22:00	
P	33 *	End user	Time switch program DHW 2nd period on (hh:mm)	-----	
P	34 *	End user	Time switch program DHW 2nd period off (hh:mm)	-----	
P	35 *	End user	Time switch program DHW 3rd period on (hh:mm)	-----	
P	36 *	End user	Time switch program DHW 3rd period off (hh:mm)	-----	
P	45	End user	Standard time switch programs for HC and DHW (press both buttons "- + " for 3 seconds until n°1 appears on display. Press the info button (i) to return.	0	
H	90	Installer	Reduced DHW temperature setpoint (°C - parameter 508)	10	

MASTER LIST HMI DEFAULT PARAMETERS				WH	
				46	65
LEVEL	PARAMETERS AGU 2.310	LEVEL DESCRIPTION	DESCRIPTION	50 kW	70 kW
H	91	Installer	DHW program on/off (0=activated; 1=deactivated: D.H.W. 24h/day)	1	
H	93	Installer	*Not used*	0	
H	505	installer	Boiler setpoint at design outside temperature (°C - for HC1)	80	
H	507	installer	Maximum flow setpoint temperature with AGU 2.500 (°C)	80	
H	508	installer	Minimum DHW setpoint temperature (°C)	10	
H	509	installer	Maximum DHW setpoint temperature (°C)	60	
H	510	installer	Flow temperature setpoint boost with DHW charging (°C)	25	
H	514	installer	Boiler temperature setpoint boost with mixing circuit with AGU 2.500 (°C)	5	
H	516	installer	Summer / winter changeover temperature (30 °C: S/W changeover deactivated)	20	
H	522	installer	*Not used*	20	
H	525	installer	Maximum switch-off differential of burner in heating mode (°C)	5	
H	527	installer	Minimum switch-off differential of burner in DHW heating mode (°C)	5	
H	528	installer	Maximum switch-off differential of burner in DHW heating mode (°C)	5	
H	532	installer	Heating curve slope heating circuit HC1	15	

MASTER LIST HMI DEFAULT PARAMETERS				WH	
				46	65
LEVEL	PARAMETERS AGU 2.310	LEVEL DESCRIPTION	DESCRIPTION	50 kW	70 kW
H	533	installer	Heating curve slope heating circuit HC2 with AGU 2.500	15	
H	535	installer	Room setpoint readjustment heating circuit HC2 with AGU 2.500	0	
H	536	installer	Maximum speed at maximum output in heating mode (rpm - maximum speed limitation)	75	85
H	541	installer	Maximum degree of modulation in heating mode (%)	14	19
H	542	installer	Minimum boiler output in kW (75/60°C)	45	65
H	543	installer	Maximum boiler output in kW (75/60°C)		
H	544	installer	Overrun time of pumps, max. 218 min	10	
H	545	installer	Minimum burner pause time (min - heat demand-dependent switching hysteresis)	180	
H	551	installer	Constant for quick setback without room influence	20	
H	552 (**)	installer	Hydraulic system adjustment	2 (or 50, 80)	
H	553 (**)	installer	Configuration of heating circuits	21 (or 12)	
H	566	installer	Proportional coefficient of DHW controller	0,5	
H	568	installer	Integral action time of DHW controller	20	
H	596	installer	Running time of actuator in heating circuit HC2 with AGU 2.500	180	
H	602	installer	*Not used*	0	
H	604	installer	Time synchronization with RVA 46 – RVA 47	00010000	
H	605	installer	LPB device number of LMU	1	
H	606	installer	LPB segment number of LMU	0	
H	607	installer	*Not used*	42	
H	608	installer	Setting value of modulation air at ignition load (PWM%),	20	16

MASTER LIST HMI DEFAULT PARAMETERS				WH	
				46	65
LEVEL	PARAMETERS AGU 2.310	LEVEL DESCRIPTION	DESCRIPTION	50 kW	70 kW
H	609	installer	Setting value of modulation (PWM%) air at low-fire; lower limit modulation range	15	15
H	610	installer	Setting value of modulation (PWM%) air at high-fire; upper limit modulation range	75	85
H	611	installer	Setting value of required speed (rpm) at ignition load	2000	1900
H	612	installer	Setting value of required speed (rpm) at low-fire	1900	1850
H	613	installer	Setting value of required speed (rpm) at high-fire	5500	6000
H	615	installer	Function programmable output AGU 2.500	9	
H	619	installer	Function programmable output 1 AGU 2.51x	2	
H	620	Installer	Function programmable output 2 AGU 2.51x	3	
H	621	installer	Function programmable output 3 AGU 2.51x	4	
H	632 (**)	installer	Configuration of System with supplementary pump	00001100 (or 00001111)	
H	639	Installer	*Not used*	0	
H	640	Installer	Setting value pre purge time (s)	20	
H	641	Installer	Setting value post purge time (s)	10	
H	648	Installer	Duration of (Controller delay) after start up when cycling in instantaneous D.H.W. outlet operation ; output delivered now is that prior to shutdown	0	
H	651	installer	MANUFACTURE information	201	
H	652	installer	MANUFACTURE information	7450	7650
H	653	Installer	Setting value of modulation PWM (%) during prepurging	50	
H	654	Installer	Setting value of required speed (rpm) during prepurging	4600	
H	657	Installer	Setting value of ANTILEGIONELLA function **60…80 °C = setting temperature range 0 = function inactive**	0	
(*) These parameters are displayed only when parameter H 91 = 0 (activated) (**) For these parameters see the boiler manual					